

ABSTRACT

A waste water treatment plant includes a treatment chamber or reactor (26) containing a plurality of buoyant sludge carriers (38). In the base of the treatment chamber (26) is a biofilm collection chamber (40). Arranged coaxially within the chamber (26) is a hollow shaft (30) with an air injection device (32) arranged at the foot thereof. In use waste water is introduced into the treatment chamber through an inlet (28) and is caused to circulate around the treatment chamber through the pumping action of the shaft (30) and air injector. Treated water passes through the biofilm collection chamber (40) to an outer settlement chamber (42) having an outlet (44) for treated water.